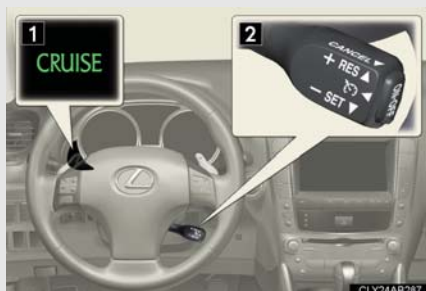


2-4. Using other driving systems

Cruise control

Use the cruise control to maintain a set speed without depressing the accelerator pedal.



- 1 Indicator
- 2 Cruise control switch

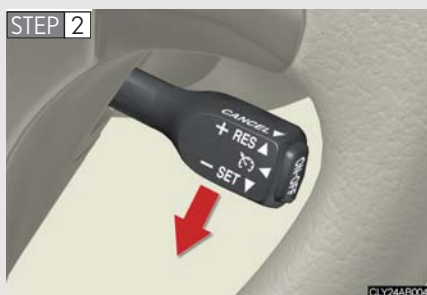
Setting the vehicle speed



Press the "ON-OFF" button to activate the cruise control.

Cruise control indicator will come on.

Press the button again to deactivate the cruise control.



Accelerate or decelerate the vehicle to the desired speed, and push the lever down to set the speed.

The vehicle speed at the moment the lever is released becomes the set speed.

■ Adjusting the set speed

To change the set speed, operate the lever until the desired set speed is obtained.



- 1 Increases the speed
- 2 Decreases the speed

Fine adjustment: Momentarily move the lever in the desired direction.

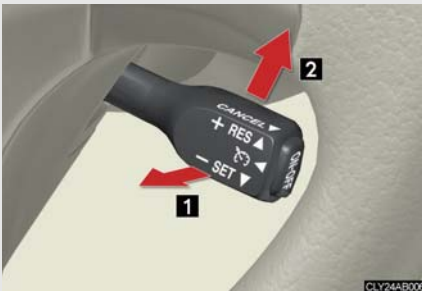
Large adjustment: Hold the lever in the desired direction.

The set speed will be increased or decreased as follows:

Fine adjustment: By approximately 1 mph (1.6 km/h) each time the lever is operated.

Large adjustment: The set speed can be increased or decreased continually until the lever is released.

■ Canceling and resuming the constant speed control



- 1 Pulling the lever toward you cancels the constant speed control.

The speed setting is also canceled when the brakes are applied.

- 2 Pushing the lever up resumes the constant speed control.

Resuming is available when the vehicle speed is more than approximately 25 mph (40 km/h)

■ Cruise control can be set when

- The shift lever is in the D or range 4 or higher of S has been selected.
- Range 4 or higher has been selected by using the paddle shift.
- Vehicle speed is above approximately 25 mph (40 km/h).

■ Accelerating after setting the vehicle speed

- The vehicle can be accelerated normally. After acceleration, the set speed resumes.
- Even without canceling the cruise control, the set speed can be increased by first accelerating the vehicle to the desired speed and then pushing the lever down to set the new speed.

■ Automatic cruise control cancelation

Cruise control will stop maintaining the vehicle speed in any of the following situations.

- Actual vehicle speed falls more than approximately 10 mph (16 km/h) below the preset vehicle speed.
At this time, the memorized set speed is not retained.
- Actual vehicle speed is below approximately 25 mph (40 km/h).
- VSC is activated.

■ If the cruise control indicator light flashes

Press the "ON-OFF" button once to deactivate the system, and then press the button again to reactivate the system.

If the cruise control speed cannot be set or if the cruise control cancels immediately after being activated, there may be a malfunction in the cruise control system. Have the vehicle inspected by your Lexus dealer.

CAUTION

■ To avoid operating the cruise control by mistake

Switch the cruise control off using the “ON-OFF” button when not in use.

■ Situations unsuitable for cruise control

Do not use cruise control in any of the following situations.

Doing so may result in loss of control and could cause an accident resulting in death or serious injury.

- In heavy traffic
- On roads with sharp bends
- On winding roads
- On slippery roads, such as those covered with rain, ice or snow
- On steep hills
Vehicle speed may exceed the set speed when driving down a steep hill.
- During emergency towing

2-4. Using other driving systems

Intuitive parking assist*

The distance to obstacles measured by the sensors is communicated via the multi-information display and a buzzer when parallel parking or maneuvering into a garage. Always check the surrounding area when using this system.

► With navigation system

For vehicles equipped with a navigation system, refer to the separate "Navigation System Owner's Manual" for further details.

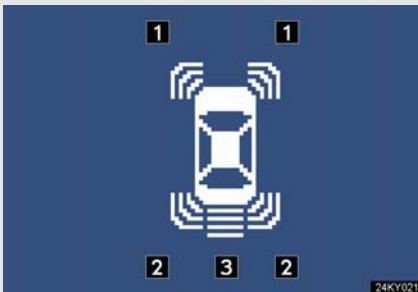
► Without navigation system

■ Types of sensors



- 1 Front corner sensors
- 2 Rear corner sensors
- 3 Back sensors

■ Multi-information display (→P.162)



- 1 Front corner sensor operation
- 2 Rear corner sensor operation
- 3 Back sensor operation

*: If equipped

■ Intuitive parking assist switch (→P. 333)






When on, an indicator is displayed to inform the driver that the function is operational.




The distance display and buzzer

When a sensor detects an obstacle, the direction of and the approximate distance to the obstacle are displayed and the buzzer sounds.





■ Front corner sensors

Multi-information display	Approximate distance to obstacle	Buzzer
	1.6 to 1.3 ft. (50 to 40 cm)	Medium
	1.3 to 1.0 ft. (40 to 30 cm)	Fast
	1.0 ft. (30 cm) or less	Continuous

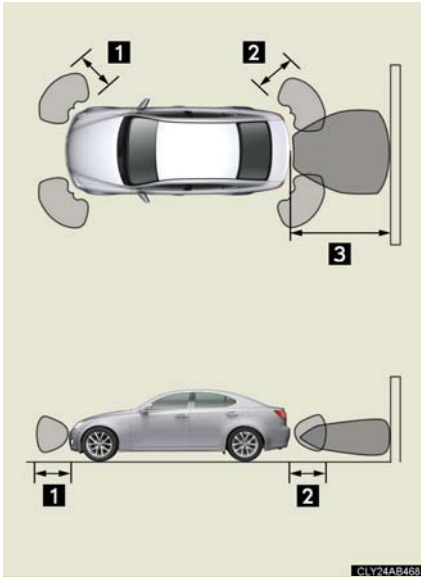
Rear corner sensors

Multi-information display	Approximate distance to obstacle	Buzzer
	1.6 to 1.2 ft. (50 to 37.5 cm)	Medium
	1.2 to 0.8 ft. (37.5 to 25 cm)	Fast
	0.8 ft. (25 cm) or less	Continuous

Back sensors

Multi-information display	Approximate distance to obstacle	Buzzer
	4.9 to 2.0 ft. (150 to 60 cm)	Slow
	2.0 to 1.5 ft. (60 to 45 cm)	Medium
	1.5 to 1.1 ft. (45 to 35 cm)	Fast
	1.1 ft. (35 cm) or less	Continuous

Detection range of the sensors



- 1 Approximately 1.6 ft. (50 cm)
- 2 Approximately 1.6 ft. (50 cm)
- 3 Approximately 4.9 ft. (150 cm)

The diagram shows the detection range of the sensors. Note that the sensors cannot detect obstacles that are extremely close to the vehicle.

The range of the sensors may change depending on the shape of the object etc.

■ Sensor detection information

- Certain vehicle conditions and the surrounding environment may affect the ability of the sensor to correctly detect obstacles. Particular instances where this may occur are listed below.
 - There is dirt, snow or ice on the sensor.
 - The sensor is frozen.
 - The sensor is covered in any way.
 - The vehicle is leaning considerably to one side.
 - On an extremely bumpy road, on an incline, on gravel, or on grass.
 - The vicinity of the vehicle is noisy due to vehicle horns, motorcycle engines, air brakes of large vehicles, or other loud noises producing ultrasonic waves.
 - There is another vehicle equipped with parking assist sensors in the vicinity.
 - The sensor is coated with a sheet of spray or heavy rain.
 - The vehicle is equipped with a fender pole or wireless antenna.
 - Towing eyelets are installed.
 - The bumper or sensor receives a strong impact.
 - The vehicle is approaching a tall or curved curb.
 - In harsh sunlight or intense cold weather.

In addition to the examples above, there are instances in which, because of their shapes, signs and other objects may be judged by the sensor to be closer than they are.

- The shape of the obstacle may prevent the sensor from detecting it. Pay particular attention to the following obstacles.
 - Wires, fences, ropes etc.
 - Cotton, snow and other materials that absorb radio waves
 - Sharply-angled objects
 - Low obstacles
 - Tall obstacles with upper sections projecting outwards in the direction of your vehicle

■ When the display flashes and a message is displayed

→P. 473

■ Certification

- ▶ For vehicles sold in the U.S.A.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

- ▶ For vehicles sold in Canada

This ISM device complies with Canadian ICES-001.

Cet appareil ISM est conforme à la norme NMB-001 du Canada.

■ Customization that can be configured at Lexus dealer

Settings (e.g. buzzer volume) can be changed. (Customizable features →P. 542)

CAUTION

■ Caution when using the intuitive parking sensor

Observe the following precautions.

Failing to do so may result in the vehicle being unable to be driven safely and possibly cause an accident.

- Do not use the sensor at speeds in excess of 6 mph (10 km/h).
- Do not attach any accessories within the sensor range.

NOTICE

■ Notes when washing the vehicle

Do not apply intensive bursts of water or steam to the sensor area.
Doing so may result in the sensor malfunctioning.

Driving assist systems

To help enhance driving safety and performance, the following systems operate automatically in response to various driving situations. Be aware, however, that these systems are supplementary and should not be relied upon too heavily when operating the vehicle.

■ ABS (Anti-lock Brake System)

Helps to prevent wheel lock when the brakes are applied suddenly, or if the brakes are applied while driving on a slippery road surface.

■ Brake assist

Generates an increased level of braking force after the brake pedal is depressed, when the system detects a panic stop situation.

■ VSC (Vehicle Stability Control)

Helps the driver to control skidding when swerving suddenly or turning on slippery road surfaces.

■ TRAC (Traction Control)

Maintains drive power and prevents the rear wheels (2WD models) or all wheels (AWD models) from spinning when starting the vehicle or accelerating on slippery roads.

■ Hill-start assist control

Helps to prevent the vehicle from rolling backward when starting on an incline or slippery slope.

■ EPS (Electric Power Steering)

Employs an electric motor to reduce the amount of effort needed to turn the steering wheel.

■ VDIM (Vehicle Dynamics Integrated Management)

Provides integrated control of the ABS, brake assist, TRAC, VSC, hill-start assist control, and EPS systems.

Helps to maintain vehicle stability when swerving on slippery road surfaces by controlling the brakes, engine output and steering assist.

When the VSC/TRAC/hill-start assist control systems are operating



The slip indicator light flashes to indicate that the VSC/TRAC/hill-start assist control systems have been engaged.

The stop lights and high mounted stoplight turn on when the hill-start assist control system is operating.

To disable TRAC/VSC

If the vehicle gets stuck in fresh snow or mud, TRAC and VSC may reduce power from the engine to the wheels. You may need to turn the system off to enable you to rock the vehicle in order to free it.

■ Turning off TRAC



Quickly push and release the switch to turn off TRAC.

A message will be shown on the multi-information display.

Push the switch again to turn the system back on.

■ Turning off TRAC and VSC



Push and hold the switch for more than 3 seconds or more while the vehicle is stopped to turn off TRAC and VSC.

A message will be shown on the multi-information display and the VSC off indicator light will come on.

Push the switch again to turn the system back on.

- **When the message is displayed on the multi-information display showing that TRAC has been disabled even if the VSC off switch has not been pressed**

TRAC and hill-start assist control cannot be operated. Contact your Lexus dealer.

- **Automatic reactivation of the TRAC/VSC systems**

If the TRAC/VSC systems are turned off, re-starting the engine will automatically reactivate them.

- **Automatic TRAC reactivation**

If only the TRAC system is turned off, the TRAC system will turn on when vehicle speed increases.

- **Automatic TRAC and VSC reactivation**

If the TRAC and VSC systems are turned off, the systems will not turn on even when vehicle speed increases.

- **Sounds and vibrations caused by the ABS, brake assist, VSC, TRAC and hill-start assist control systems**

- A sound may be heard from the engine compartment if the brake pedal is depressed repeatedly when the engine is started or just after the vehicle begins to move. This sound does not indicate that a malfunction has occurred in any of these systems.
- Any of the following conditions may occur when the above systems are operating. None of these indicates that a malfunction has occurred.
 - Vibrations may be felt through the vehicle body and steering.
 - A motor sound may be heard after the vehicle comes to a stop.
 - The brake pedal may pulsate slightly when the ABS is activated.
 - The brake pedal may move down slightly after the ABS is activated.

■ Hill-start assist control is operational when

- The shift lever is in the D or S position.
- The brake pedal is not depressed.
- The system has detected that the vehicle is moving backward.

■ EPS operation sound

When the steering wheel operates, a motor sound (whirring sound) may be heard. This does not indicate a malfunction.

■ Reduced effectiveness of EPS

The effectiveness of EPS is reduced to prevent the system from overheating when there is frequent steering input over an extended period of time. The steering wheel may feel heavy as a result. Should this occur, refrain from excessive steering input or stop the vehicle and turn the engine OFF. The system should return to normal within 10 minutes.

■ If the slip indicator comes on

It may indicate a malfunction in the VSC, TRAC or hill start assist control function. Contact your Lexus dealer.

⚠ CAUTION

■ The ABS does not operate effectively when

- The limits of tire gripping performance have been exceeded (such as excessively worn tires on a snow covered road).
- The vehicle hydroplanes while driving at high speed on the wet or slick road.

■ Stopping distance when the ABS is operating may exceed that of normal conditions

The ABS is not designed to shorten the vehicle's stopping distance. Always maintain a safe distance from the vehicle in front of you, especially in the following situations.

- When driving on dirt, gravel or snow-covered roads
- When driving with tire chains
- When driving over bumps in the road
- When driving over roads with potholes or roads with uneven surfaces

CAUTION

■ **TRAC may not operate effectively when**

Directional control and power may not be achievable while driving on slippery road surfaces, even if the TRAC system is operating.

Do not drive the vehicle in conditions where stability and power may be lost.

■ **If hill-start assist control does not operate effectively**

Do not overly rely on the hill-start assist control. The hill-start assist control may not operate effectively on steep inclines and roads covered in ice.

■ **When the VSC is activated**

The slip indicator light flashes. Always drive carefully. Reckless driving may cause an accident, resulting in death or serious injury. Exercise particular care when the indicator light flashes.

■ **When TRAC and VSC are off**

Be especially careful and drive at a speed appropriate to the road conditions. As these are systems to help enhance vehicle stability and driving force, do not turn off TRAC and VSC unless necessary.

■ **Replacing tires**

Make sure that all tires are of the specified size, brand, tread pattern and total load capacity. In addition, make sure that the tires are inflated to the recommended tire pressure level.

The ABS, VSC and TRAC systems will not function correctly if different tires are fitted on the vehicle.

Contact your Lexus dealer for further information when replacing tires or wheels.

■ **Handling of tires and suspension**

Using tires with any kind of problem or modifying the suspension will affect the driving assist systems, and may cause the system to malfunction.